

What is claimed is:

1. An amusement system using living body measurement by light, said system comprising:

    a light irradiator for irradiating a living body with light;

    a light detector for detecting the light that has been emitted from said irradiator and which has propagated through the living body;

    a signal processor for processing the signal of light intensity detected by said detector; and

    a display unit for displaying the processing results from the signal processor;

    wherein arrangements are so made as to set the range of displaying on the screen of said display unit a change in intensity of said transmitted light according to the results of a test task carried out on said living body.

2. An amusement system using living body measurement by light, said system comprising:

    a light irradiator for irradiating a living body with light;

    a light detector for detecting the light that has been emitted from said irradiator and which has propagated through the living body;

    a signal processor for processing the signal of light intensity detected by said detector; and

a display unit for displaying the processing results from the signal processor;

wherein arrangements are so made as to time-wise integrate a change in the intensity of light that has been propagated through said living body and to reflect the integrated results in an object displayed on the screen of said display unit.

3. An amusement system using living body measurement by light, said system comprising:

a light irradiator for irradiating a living body with light;

a light detector for detecting the light that has been emitted from said irradiator and which has propagated through the living body;

a signal processor for processing the signal of light intensity detected by said detector; and

a display unit for displaying the processing results from the signal processor;

wherein arrangements are so made that the condition of an object shown on said display unit changes at any time intervals using the signal of light intensity that has been propagated through said living body and a signal that is issued by said signal processor.

4. An amusement system using living body measurement by light, said system comprising:

a light irradiator for irradiating a living body

with light;

a light detector for detecting the light that has been emitted from said irradiator and which has propagated through the living body;

a signal processor for processing the signal of light intensity detected by said detector; and

a display unit for displaying the processing results from the signal processor;

wherein arrangements are so made to set a period during which the condition of at least one object displayed on the screen of the display unit changes according to a change in the intensity of light that has been propagated through the living body and a period during which the condition of the object changes according to any signal issued by the signal processor.

5. The amusement system using living body measurement by light of claim 1, wherein the display range of the intensity of transmitted light displayed on the screen of the display unit is decided on the basis of the maximum value and minimum value of the intensity of transmitted light that is detected.

6. An amusement system using living body measurement by light, said system comprising:

a first light irradiator for irradiating a first living body with light;

a second light irradiator for irradiating a second

living body with light;

a first light detector for detecting the light that has been emitted from said first irradiator and which has propagated through the first living body;

a second light detector for detecting the light that has been emitted from said second irradiator and which has propagated through the second living body;

a signal processor for processing the signal of light intensity detected by said first and second detectors; and

a display unit for displaying the processing results from the signal processor;

wherein arrangements are so made that the intensities of light rays which have been propagated through the first and second living bodies are each time-wise integrated and the integrated results are reflected in an object displayed on the screen of the display unit, thereby displaying the degree of affinity between the first and second living bodies.

7. A head setter for an amusement system using living body measurement by light, the head setter having:

an optical fiber holder provided with at least a pair of optical fibers, one for irradiation and the other for detection; and

a flexible resin part provided with a guide that enables the optical fiber holder to move in a specific

direction;

wherein said optical fiber holder is detachably provided on the guide of said flexible resin part.

8. The head setter for an amusement system using living body measurement by light of claim 7, wherein said resin part does not have a stopper part that prevents said resin part from deforming.

9. An amusement system using living body measurement by light, a method for executing said system comprising the steps of:

putting first and second probes on first and second players, said first and second probes detecting the light that has irradiated a living body and propagated through the living body;

activating a first program to direct the predetermined movement of at least one object displayed on the screen of a display unit; and

activating a second program to change the movement of at least one object on said screen according to signals from said first and second probes;

wherein arrangements are so made as to make it possible to change the predetermined movement of said object on said screen in response to the signals from said first and second probes.

10. A program for an amusement system using living body measurement by light, said program having a function

of freely changing the predetermined movement of a plurality of objects on a display screen with output signals being used as actuating signals, said output signals being from the probe that detects light that has irradiated a living body and propagated through the living body.